

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	F	ILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/081,694		02/22/2002	Theodore B. Ziemkowski	10018566-1	1289
22879	7590	02/09/2005		EXAM	INER
HEWLET	PACKA	RD COMPANY	DANIELS, ANTHONY J		
POBOX 27	72400, 340	14 E. HARMONY F			
INTELLEC	TUAL PR	OPERTY ADMINI	ART UNIT	PAPER NUMBER	
FORT COLLINS, CO 80527-2400 2615					

DATE MAILED: 02/09/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

	Applica	tion No.	Applicant(s)				
	10/081,	694	ZIEMKOWSKI, THEODORE B.				
Office Action Summa	Ty Examin	er	Art Unit				
	Anthony	J. Daniels	2615				
The MAILING DATE of this con							
Period for Reply							
A SHORTENED STATUTORY PERIOD THE MAILING DATE OF THIS COMI - Extensions of time may be available under the proafter SIX (6) MONTHS from the mailing date of thi - If the period for reply specified above is less than - If NO period for reply is specified above, the maxil - Failure to reply within the set or extended period for Any reply received by the Office later than three mearned patent term adjustment. See 37 CFR 1.70	MUNICATION. Divisions of 37 CFR 1.136(a). In no sommunication. Sthirty (30) days, a reply within the simum statutory period will apply and or reply will, by statute, cause the a sonths after the mailing date of this	event, however, may a reply be tir tatutory minimum of thirty (30) day will expire SIX (6) MONTHS from pplication to become ABANDONE	mely filed ys will be considered timely. In the mailing date of this communication. ED (35 U.S.C. § 133).				
Status							
1) Responsive to communication(s) filed on						
2a) ☐ This action is FINAL .	This action is FINAL . 2b)⊠ This action is non-final.						
3) Since this application is in cond	3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
closed in accordance with the	oractice under Ex parte 0	Quayle, 1935 C.D. 11, 4	53 O.G. 213.				
Disposition of Claims							
4)⊠ Claim(s) <u>1-28</u> is/are pending in	the application.						
4a) Of the above claim(s)		consideration.					
5) Claim(s) is/are allowed.							
6)⊠ Claim(s) <u>1-28</u> is/are rejected.							
7) Claim(s) is/are objected	Claim(s) is/are objected to.						
8) Claim(s) are subject to r	estriction and/or election	requirement.					
Application Papers							
9)☐ The specification is objected to	by the Examiner.						
10)⊠ The drawing(s) filed on <u>22 Febr</u>	•	ccepted or b)☐ objecte	ed to by the Examiner.				
Applicant may not request that any	, , , , , , , , , , , , , , , , , , , ,		•				
Replacement drawing sheet(s) inc							
11)☐ The oath or declaration is objec	ted to by the Examiner. I	Note the attached Office	Action or form PTO-152.				
Priority under 35 U.S.C. § 119							
12) Acknowledgment is made of a c	laim for foreign priority u	nder 35 U.S.C. & 119/a)-(d) or (f)				
a) ☐ All b) ☐ Some * c) ☐ None	• • •		, (4) 5. (1).				
1. ☐ Certified copies of the pr		een received.					
2. Certified copies of the priority documents have been received in Application No							
3. Copies of the certified co	•	• •					
application from the Inter	national Bureau (PCT R	ule 17.2(a)).	-				
* See the attached detailed Office	action for a list of the cer	rtified copies not receive	ed.				
Attachment(s)							
1) Notice of References Cited (PTO-892)		4) Interview Summary	(PTO-413)				
2) Notice of Draftsperson's Patent Drawing Rev		Paper No(s)/Mail D	ate				
3) Information Disclosure Statement(s) (PTO-14 Paper No(s)/Mail Date	449 or PTO/SB/08)	5)	Patent Application (PTO-152)				
S. Patent and Trademark Office PTOL-326 (Rev. 1-04)	Office Action Sumn	nary Pa	art of Paper No./Mail Date 20050125				

DETAILED ACTION

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 1. Claims 1,3,4,8,17,18,20-22 are rejected under 35 U.S.C. 102(b) as being anticipated by Steinberg et al. (US # 6,006,039).

As to claim 1, Steinberg et al. teaches a digital image capturing system (see Figure 1, cameras "10","12") comprising: at least two digital image capturing devices (see Figure 1, cameras "10","12"); and a bi-directional link cable (see Col. 3, Lines 52-54) connecting said at least two digital image capturing devices (see Figure 1, cable "28"); wherein said at least two digital image capturing devices are capable of sharing data items over said bi-directional link cable (see Col. 3, Lines 52-54).

As to claim 3, Steinberg et al. teaches the device of claim 1, wherein the sharing of said data items comprises sharing images (see Col. 2, Lines 33-35, "...with a particular image data,").

As to claim 4, Steinberg et al. teaches the device of claim 1, wherein the sharing of said data items comprises sharing image information (see Col. 2, Lines 33-35, "...downloading of graphics and textual information to be included with a particular image data,").

As to claim 8, Steinberg et al. teaches the device of claim 1, wherein a digital image capturing device of said at least two digital image capturing devices operates as a pseudo host

(see Col. 3, Lines 52-54; {The digital camera that transmits, or uploads, the data to the other digital camera is the pseudo host.}).

As to claim 17, Steinberg et al. teaches a method of linking a first digital image capturing device to one or more other digital image capturing devices (see Figure 1, cameras "10","12", and cable "28"), comprising the steps of: providing at least two digital image capturing devices capable of sending and receiving data items over a bi-directional link cable (see Col. 3, Lines 52-54); and providing I/O ports on said at least two digital image capturing devices (see Figure 1, port "16" on both cameras; Col. 3, Lines 52-54).

As to claim 18, Steinberg et al. teaches the method of claim 17, further comprising the step of sharing data items (see Col. 3, Lines 52-54).

As to claim 20, claim 20 is a method claim corresponding to the apparatus claim 3. Therefore, claim 20 is analyzed and rejected as previously discussed with respect to the apparatus claim 3.

As to claim 21, claim 21 is a method claim corresponding to the apparatus claim 4. Therefore, claim 21 is analyzed and rejected as previously discussed with respect to the apparatus claim 4.

As to claim 22, Steinberg et al. teaches the method of claim 17, with the step of providing at least two digital image capturing devices (see Figure 1, cameras "10","12") further comprising providing one or more digital image capturing devices capable of operating as a pseudo host (see Col. 3, Lines 52-54; {The digital camera that transmits, or uploads, the data to the other digital camera is the pseudo host.}).

Art Unit: 2615

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 2,19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Steinberg et al. (see Patent Number above) in view of Kiyokawa (6,204,877).

As to claim 2, Steinberg et al. teaches the device of claim 1. The claim differs from Steinberg et al. in that it further requires that the sharing of data items comprises sharing real time views.

In the same field of endeavor, Kiyokawa teaches the transmission of image data from an electronic imaging apparatus to an electronic image pickup apparatus in real time (see Col. 2, Lines 13-18; "...transmitting *upon* photoelectric conversion..."). In light of the teaching of Kiyokawa, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the system of Steinberg et al. to include real time transmission of the images data, as taught by Kiyokawa, because an artisan of ordinary skill in the art would recognize that real time transmission of image data allows users of the system to be view on a particular scene, in real time, even if they are not physically in the vicinity or witnessing the scene.

As to claim 19, claim 19 is a method claim corresponding to the apparatus claim 2. Therefore, claim 19 is analyzed and rejected as previously discussed with respect to the apparatus claim 2.

Art Unit: 2615

3. Claims 5,6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Steinberg et al. (see Patent Number above).

As to claim 5, Steinberg et al. fails to teach the bidirectional link cable comprising an audio/visual (A/V) cable. **Official Notice** is taken that audio/visual (A/V) cables are well known and expected in the art. It would have been obvious to an artisan of ordinary skill in the art to include an audio/visual (A/V) cable as a bidirectional link cable in Steinberg et al., because these cables are space efficient, as pertains to the manufacturing of the port to which it is connected, and can be used to transmit data of high fidelity over several meters.

As to claim 6, Steinberg et al. fails to teach the bidirectional link cable comprising a universal serial bus (USB) cable. **Official Notice** is taken that universal serial bus (USB) cables are well known and expected in the art. It would have been obvious to an artisan of ordinary skill in the art to include a universal serial bus (USB) cable as a bidirectional link cable in Steinberg et al., because these cables offers high-speed transmission of data, and are compatible with many other digital products.

4. Claims 7,9,10,12-16,23,24,26-28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Steinberg et al. (see Patent Number above) in view of Watanabe (US 20020196197).

As to claim 7, Steinberg et al. teaches the device of claim 1, with a digital image capturing device of said at least two digital image capturing devices (see Figure 1, camera "10") further comprising: an input/output (1/0) port (see Figure 1, port "16"; Col. 3, Lines 52-54) capable of connecting to said bi-directional link cable (see Figure 1, cable "28"; Col. 3, Lines 52-

54); a processor communicating with said I/O port (see Figure 4, processor "122", cable connector (port) "16", bus line "136"; Col. 7, Lines 6-8)); and a memory communicating with said processor (see Figure 4, memory "126", processor "122", bus line "124") and including an image storage (see Col. 7, Line 21), an image receive driver, and an image transmit drive (The examiner is interpreting an image receive driver and image transmit driver in a way, such that, it would be inherent that memory contain software that drive the transmission and reception of image data; furthermore, applicant is advised to refer to Col. 7, Lines 16-20 in Steinberg et al.); wherein, said processor determines if said digital image capturing device is a master or a slave (The examiner is interpreting an image capturing device as a master or a slave, such that it would be inherent that a camera in the system of Steinberg et al. would be declared the master by the initial transfer of data, and by default, the receiving camera would be the slave.), and shares said data items over said bi-directional link cable (see Col. 3, Lines 52-54). The claim differs from Steinberg et al. in that it further requires that said processor determines if said I/O port is connected to said bi-directional link cable.

In the same field of endeavor, Watanabe teaches connection detection means for detecting a connection state between a computer and a digital camera (see [0231], Lines 1-6). In light of the teaching of Watanabe, it would have been obvious to one of ordinary skill in the art at the time the invention was made to include the connection detection means of Watanabe in the system of Steinberg et al., because an artisan of ordinary skill in the art would recognize that this connection detection means would prevent accidental transfer without a cable, which would cause a loss of data, thereby making the camera system safer and more efficient.

As to claim 9, Steinberg et al. teaches a digital image capturing device, comprising: an input/output (1/0) port (see Figure 1, port "16"; Col. 3, Lines 52-54) capable of connecting to said bi-directional link cable (see Figure 1, cable "28"; Col. 3, Lines 52-54); a processor communicating with said I/O port (see Figure 4, processor "122", cable connector (port) "16", bus line "136"; Col. 7, Lines 6-8)); and a memory communicating with said processor (see Figure 4, memory "126", processor "122", bus line "124") and including an image storage (see Col. 7, Line 21), an image receive driver, and an image transmit driver (The examiner is interpreting an image receive driver and image transmit driver in a way, such that, it would be inherent that memory contain software that drive the transmission and reception of image data; furthermore, applicant is advised to refer to Col. 7, Lines 16-20 in Steinberg et al.); wherein, said processor determines if said digital image capturing device is a master or a slave (The examiner is interpreting an image capturing device as a master or a slave, such that it would be inherent that a camera in the system of Steinberg et al. would be declared the master by the initial transfer of data, and by default, the receiving camera would be the slave.), and shares said data items over said bi-directional link cable (see Col. 3, Lines 52-54). The claim differs from said processor determines if said I/O port is connected to said bi-directional link cable.

In the same field of endeavor, Watanabe teaches a connection detection means for detecting a connection state between a computer and a digital camera (see [0231], Lines 1-6). In light of the teaching of Watanabe, it would have been obvious to one of ordinary skill in the art at the time the invention was made to include the connection detection means of Watanabe in the system of Steinberg et al., because an artisan of ordinary skill in the art would recognize that this

connection detection means would allow the image transfer system to start without switching from the user.

As to claim 10, Steinberg et al., as modified by Watanabe, teaches the device of claim 9, wherein the sharing of said data items comprises transmitting and receiving data items (see Steinberg et al., Col. 3, Lines 52-54).

As to claim 12, Steinberg et al., as modified by Watanabe, teaches the device of claim 9, wherein the sharing of said data items comprises sharing images (see Steinberg et al., Col. 2, Lines 33-35, "...with a particular image data,").

As to claim 13, Steinberg et al., as modified by Watanabe, teaches the device of claim 9, wherein the sharing of said data items comprises sharing image information (see Steinberg et al., Col. 2, Lines 33-35, "...downloading of graphics and textual information to be included with a particular image data,").

As to claim 14, Steinberg et al., as modified by Watanabe, fails to teach the bidirectional link cable comprising an audio/visual (A/V) cable. Official Notice is taken that audio/visual (A/V) cables are well known and expected in the art. It would have been obvious to an artisan of ordinary skill in the art to include an audio/visual (A/V) cable as a bidirectional link cable in Steinberg et al., as modified by Watanabe, because these cables are space efficient, as pertains to the manufacturing of the port to which it is connected, and can be used to transmit data of high fidelity over several meters.

As to claim 15, Steinberg et al., as modified by Watanabe, fails to teach the bidirectional link cable comprising a universal serial bus (USB) cable. Official Notice is taken that universal serial bus (USB) cables are well known and expected in the art. It would have been obvious to an

artisan of ordinary skill in the art to include a universal serial bus (USB) cable as a bidirectional link cable in Steinberg et al., as modified by Watanabe, because these cables offers high-speed transmission of data, and are compatible with many other digital products.

As to claim 16, Steinberg et al., as modified by Watanabe, teaches the device of claim 9, wherein said digital image capturing device operates as a pseudo host (see Steinberg et al., Col. 3, Lines 52-54; {The digital camera that transmits, or uploads, the data to the other digital camera is the pseudo host.}).

As to claim 23, Steinberg et al., as modified by Watanabe teaches the method of claim 17, further comprising the steps of: detecting a connection of a bi-directional link cable in said digital image capturing device (see Watanabe, [0231], Lines 1-6); accepting a master or slave input that determines whether said digital image capturing device is a master or a slave (The examiner is interpreting an image capturing device as a master or a slave, such that it would be inherent that a camera in the system of Steinberg et al. would be declared the master by the initial transfer of data, and by default, the receiving camera would be the slave.); accepting an image selection of a first data item to be sent to a connected slave digital image capturing device if said digital image capturing device is a master (The examiner is interpreting the accepting of an image selection of a first data item to be sent to a connected slave digital imaging capture device if said digital image capturing device is a master, such that it would be inherent that a master digital image capturing device transmit a specified image data to the slave.); transmitting said first data item to said connected slave digital image capturing device if said digital image capturing device is a master (This is inherent in the digital image capturing device that is the master to transmit image data), accepting a second data item from a connected master digital

image capturing device if said digital image capturing device is a slave (This is inherent in the digital image capturing device that is the slave to receive image data from the master.); and displaying said second data item on said digital image capturing device if said digital image capturing device is a slave (see Steinberg et al., Col. 2, Lines 52-55; {It is inherent in an image capturing device that an image stored on the device can be displayed, regardless of whether it is a master or a slave.}).

As to claim 24, Steinberg et al. teaches a method of linking a first digital image capturing device to one or more digital image capturing devices, comprising the steps of: accepting a master or slave input that determines whether said digital image capturing device is a master or a slave (The examiner is interpreting an image capturing device as a master or a slave, such that it would be inherent that a camera in the system of Steinberg et al. would be declared the master by the initial transfer of data, and by default, the receiving camera would be the slave.); accepting an image selection of a first data item to be sent to a connected slave digital image capturing device if said digital image capturing device is a master (The examiner is interpreting the accepting of an image selection of a first data item to be sent to a connected slave digital imaging capture device if said digital image capturing device is a master, such that it would be inherent that a master digital image capturing device transmit a specified image data to the slave.); transmitting said first data item to said connected slave digital image capturing device if said digital image capturing device is a master (This is inherent in the digital image capturing device that is the master to transmit image data), accepting a second data item from a connected master digital image capturing device if said digital image capturing device is a slave (This is inherent in the digital image capturing device that is the slave to receive image data from the

master.); and displaying said second data item on said digital image capturing device if said digital image capturing device is a slave (see Col. 2, Lines 52-55; {It is inherent in an image capturing device that an image stored on the device can be displayed, regardless of whether it is a master or a slave.}). The claim differs from said processor determines if said I/O port is connected to said bi-directional link cable.

In the same field of endeavor, Watanabe teaches connection detection means for detecting a connection state between a computer and a digital camera (see [0073]). In light of the teaching of Watanabe, it would have been obvious to one of ordinary skill in the art at the time the invention was made to include the connection detection means of Watanabe in the system of Steinberg et al., because an artisan of ordinary skill in the art would recognize that this connection detection means would allow the image transfer system to start without switching from the user.

As to claim 26, Steinberg et al., as modified by Watanabe, teaches the method of claim 24, wherein the first digital image capturing device and the second digital image capturing device share images (see Steinberg et al., Col. 2, Lines 33-35, "... with a particular image data,").

As to claim 27, Steinberg et al., as modified by Watanabe teaches the method of claim 24, wherein the first digital image capturing device and the second digital image capturing device share image information (see Steinberg et al., Col. 2, Lines 33-35, "...downloading of graphics and textual information to be included with a particular image data,").

As to claim 28, Steinberg et al., as modified by Watanabe, teaches the method of claim 24, wherein a master digital image capturing device operates as a pseudo host (see Steinberg et

al., Col. 3, Lines 52-54; {The digital camera that transmits, or uploads, the data to the other digital camera is the pseudo host.}).

4. Claims 11,25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Steinberg et al. (see Patent number above) in view of Watanabe (see Patent Number above) and further in view of Kiyokawa (see Patent Number above).

As to claim 11, Steinberg et al., as modified by Watanabe, teaches the device of claim 9. The claim differs from Steinberg et al., as modified by Watanabe, in that it further requires the sharing of said data items comprise sharing real time image views.

In the same field of endeavor, Kiyokawa teaches the transmission of image data from an electronic imaging apparatus to an electronic image pickup apparatus in real time (see Col. 2, Lines 13-18; "...transmitting *upon* photoelectric conversion..."). In light of the teaching of Kiyokawa, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the system of Steinberg et al., as modified by Watanabe, to include real time transmission of the images data, as taught by Kiyokawa, because an artisan of ordinary skill in the art would recognize that real time transmission of image data allows users of the system to be view on a particular scene, in real time, even if they are not physically in the vicinity or witnessing the scene.

As to claim 25, Steinberg et al., as modified by Watanabe, teaches the method of claim 24. The claim differs from Steinberg et al., as modified by Watanabe, in that it further requires that the first digital image capturing device and the second digital image capturing device share real time image views.

Art Unit: 2615

In the same field of endeavor, Kiyokawa teaches the transmission of image data from an electronic imaging apparatus to an electronic image pickup apparatus in real time (see Col. 2, Lines 13-18; "...transmitting *upon* photoelectric conversion..."). In light of the teaching of Kiyokawa, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the system of Steinberg et al., as modified by Watanabe, to include real time transmission of the images data, as taught by Kiyokawa, because an artisan of ordinary skill in the art would recognize that real time transmission of image data allows users of the system to be view on a particular scene, in real time, even if they are not physically in the vicinity or witnessing the scene.

Conclusion

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Anthony J. Daniels whose telephone number is (703) 305-4807. The examiner can normally be reached on 8:00 A.M. - 4:30 P.M..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's acting supervisor, Thai Tran can be reached on (703) 305-4725. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 2615

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

AD 1/26/2005

THAT THE THE PARTY EVALUATION OF THE PARTY EVALUATION